

Individual trees are best wrapped with hardware cloth, forming a cylinder standing six inches away from the trunk. Property is best fenced with welded wire fencing.

Exclusion efforts may not always be appropriate or successful. Modifications to the beaver dam and lodge are often used in addition to exclusion. If all techniques fail, State regulations control the final disposition of beavers.

#### Professional Assistance

The City shall contract with an expert wildlife biologist with beaver conflict resolution experience to assist in the overall objectives of the Beaver Control Policy for the City of Rockville, or utilize appropriate Department of Natural Resources assistance.

#### Administration and Authorization

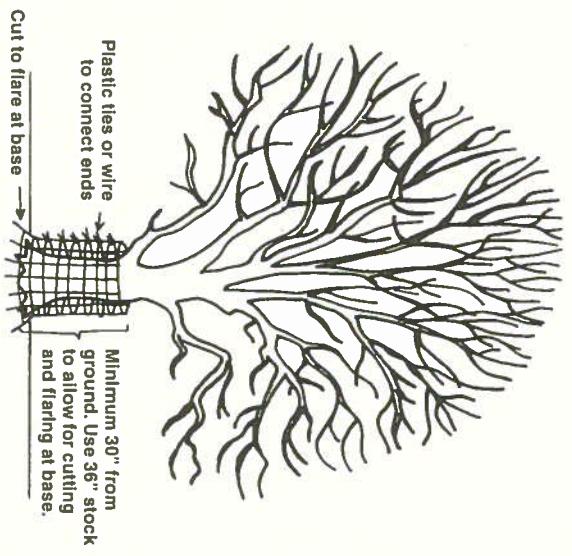
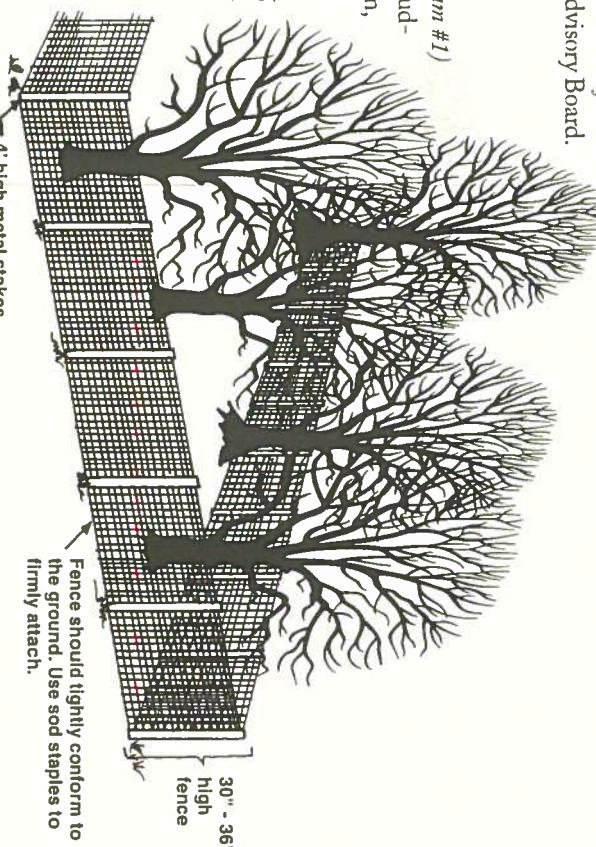
The Beaver Control Policy will be administered by the Director of Recreation and Parks, with authority provided by the adoption of this policy by the Recreation and Park Advisory Board. The Beaver Control Policy shall be subject to periodic review by the Recreation and Park Advisory Board.

*Adopted: February 23, 1995*

#### Protecting Your Individual Trees (*see diagram #1*)

Beavers prefer certain tree species, including cherry, willow, poplar, sweetgum, blackgum, birch, and pine. However, they will feed on most woody species.

Individual trees can be protected using galvanized hardware cloth or coated welded wire garden fencing. The product must be sturdy enough to support a 40-pound beaver pushing against it. There should be a minimum 1/2-inch square opening to a maximum two to three-inch opening.



# The Beaver of Rockville

## Information for Residents Living with Beavers

Provided by the City of Rockville  
Recreation and Parks Department

#### About Beavers

The beaver (*Castor canadensis*) is a semiaquatic mammal noted for the building of dams.

They are large rodents; the average adult beaver weighs about 35 pounds, but specimens as heavy as 90 pounds have been found. The beaver is usually about 30 inches long and stands less than 12 inches high. The broad, flat, scaled tail is about 10 inches long and serves as a warning signal when slapped against the water, as a support when the beaver is standing on its hind legs, and as a rudder while swimming. The body is plump, the back arched, the neck thick, the hind feet webbed, and all the digits clawed. The fur is usually reddish-brown above and lighter or grayish below. The eyes are small and the nostrils closable. The skull is massive, with marked ridges for fixing the muscles that work the jaws. The two front teeth on either jaw are like those of other rodents, wearing away more rapidly behind so as to leave a sharp, enameled chisel edge. With these the beaver can cut down large trees. It usually selects trees two to

#### Protecting Your Entire Property (*see diagram #2*)

If you have numerous preferred species on your lot and are adjacent to a stream, you may want to take more precautions. We recommend using 36-inch-high welded wire garden fencing installed tightly to the ground. Use metal 4-inch-high stakes to attach the fence. Staking should be frequent enough to conform to the topography on the site and tight enough to resist the beaver's attempt to pull it over.

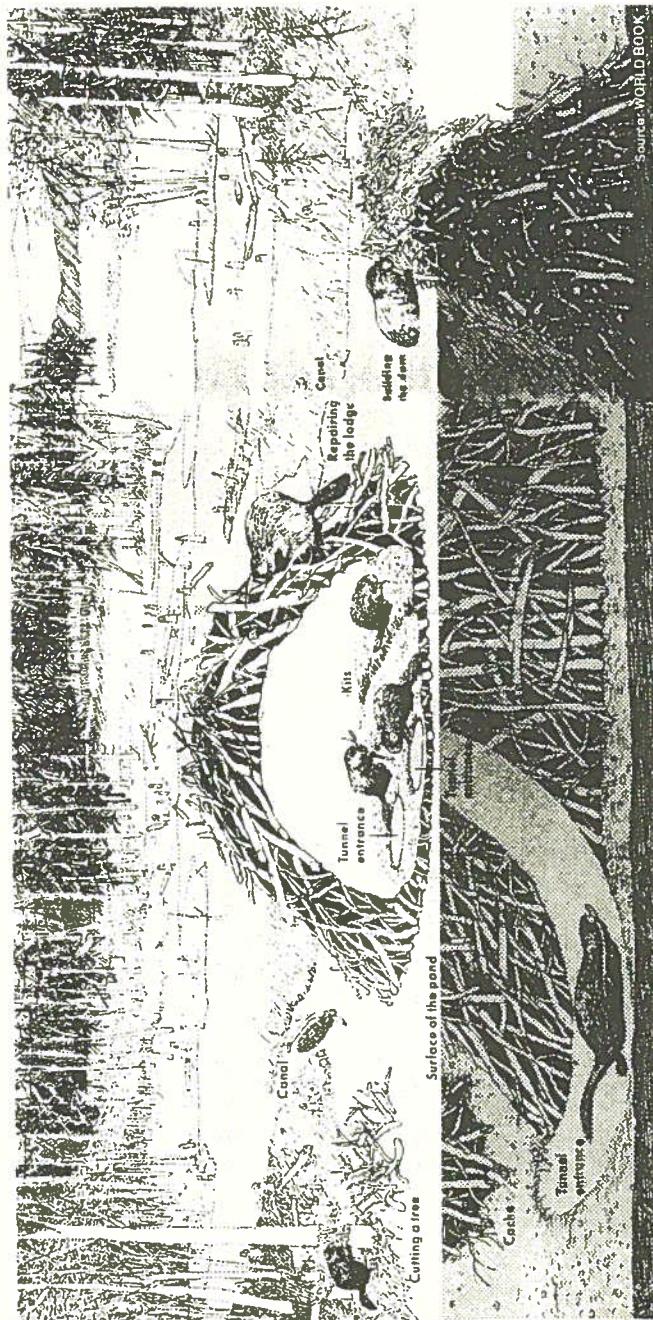
#### Diagram #2: Protecting Your Entire Property

For a complete copy of the Beaver Control Policy, contact the City's Department of Recreation and Parks at 240-314-8700 or the City's website: [www.ci.rockville.md.us](http://www.ci.rockville.md.us)

## The Dam

eight inches in diameter, but it can fell trees with diameters as large as 30 inches. Beavers have a pair of anal scent glands, called castors, that secrete a musk-like substance called astoreum, probably for marking territories. The animals tend to be monogamous and may live 20 years or more. The female has one litter a year, usually of two to four young.

The dams used by beavers to widen the area and increase the depth of water around their homes are constructed either of sticks and poles or more firmly and solidly of mud, brushwood, and stones. As time goes, by the beaver repairs and adds to the dam. Floating material lodges there, and vegetation grows on the top adds its roots to the strength of the dam. Frequently, the beaver builds a smaller dam downstream to back up some water against the original dam and decreases the pressure of water on it from the other side. The dams are about five feet high, usually more than 10 feet wide at the base, and narrow at the top. Beaver ponds attract fish, ducks, and other aquatic animals. Although the dams cause local flooding, they also help control runoff and reduce flooding downstream. The ponds eventually fill with sediment, and the animals move to a new location. The abandoned area becomes good meadowland. Although the beaver is a powerful swimmer, it has difficulty on land dragging the logs and branches it needs for building and for food. Colonies of beavers, therefore, often dig canals from the pond to a grove of trees. Such canals are up to three feet wide and deep and often several hundred feet long. The timber is then readily floated down the canal toward the pond. Some observations and experiments suggest that dam construction is the beaver's response to the sound of running water.



A beaver colony is active in getting ready for winter.

**The Lodge**  
Beavers are social animals. In areas where food is abundant and the locality secluded, the number of families in a beaver community is rather large. The so-called beaver lodge is a unique structure. The island lodge consists of a central chamber, with its floor a little above the level of the water, and with two entrances. One of these, the "wood entrance," is a straight incline rising from the water, opening into the floor of the hut. The other approach, the "beaver entrance," is more abrupt in its descent to the water. The lodge itself is an oven-shaped house of sticks, grass, and moss, woven together and plastered with mud, increasing gradually in size with year after year of repair and elaboration. The room inside may measure eight feet wide and up to three feet high. The floor is carpeted with bark, grass, and wood chips, sometimes with special storerooms adjoining.

## Beavers and Humans

The beaver means different things to different people. Only a few centuries ago, some native Americans considered the beaver a spiritual animal. The early settlers, on the other hand, saw the beaver as "living gold." Today, our perceptual images of beavers are quite different. For instance, a municipal maintenance supervisor might see the beaver as a nuisance because of flooding roads and clogged drainage culverts. However, others may see the beaver as a integral component of nature's web of life. The truth of the matter is simple; beavers can be either a positive or negative influence on our lifestyles. Learning to live with beavers, until recently, has been difficult for many people, municipalities, and state agencies.

## Rockville Beaver Management and Control Policy

In the City of Rockville, 22.6 miles of streams hold a large area of mature forest limited to stream valleys, which are natural habitat for the beaver. It is estimated that many beavers may exist within our city limits.

Wildlife is a part of our common wealth. All citizens benefit from common ownership, while at the same time assuming a shared responsibility for wildlife's well-being. In its role as the primary steward of the city's natural resources, the Department of Recreation and Parks recognizes that beavers are a natural and desirable component of the environment because they contribute to the quality and diversity of natural habitat. The City of Rockville will practice an attitude of acceptance of, and tolerance for beaver activity as part of the city's natural environment and will foster this attitude among the public through education. Conflicts arise when beaver activity impacts public areas, public health and safety, private property, or public infrastructure.

**The significance of the impact will determine what resolution action, if any, will be taken to reduce or eliminate conflict.**

Generally, where efforts are made to reduce conflict with wildlife, the most effective methods are those of exclusion — measures which deny wildlife the food or shelter which it seeks. It is the responsibility of private property owners to take reasonable steps to exclude problem wildlife from their land. In the case of beavers, these are steps which make the landscaping unattractive or unavailable. Private property owners should consider the following:

- Repellents are usually not effective and should not be relied upon.
- Sturdy fencing is the only foolproof means of exclusion.